

30. (Amended) An injectable reversible contraceptive comprising a contraceptive polymer, a solvent medium, an electrically conducting material and a magnetic material, characterised in that said contraceptive polymer is from the hydrogel class of polymers, which is a mixture of styrene maleic anhydride copolymer and styrene maleic acid copolymer, and said solvent medium is dimethyl sulphoxide solvent, and said electrically conducting material for the purpose of restoring fertility by removing the contraceptive is copper essentially consisting of microsize particles and macrosize particles, and said magnetic material for the purpose if in vivo detection, in vivo quantification, in vivo control of flow and enhanced removal of contraceptive is iron essentially consisting of microsize particles and macrosize particles.

31. (Amended) A contraceptive as claimed in claim 55 30, wherein styrene maleic acid copolymer and styrene maleic anhydride copolymer are taken in the ratio varying between 1.5:8.5 to 3:7 with respect to each other.

32. (Amended) A contraceptive claimed in claim 55 30, wherein said magnetic material is one of iron in its pure form, as at least one or in the form of its of an iron oxide, and or in a combination with a biologically accepted material, like such as

~~sulphur essentially consisting of microsize particles and macrosize particles.~~

33. (Amended) A contraceptive as claimed in claim 55 30, wherein said electrically conducting material and said magnetic material are each, being independently, between 3 to 20% by weight of said contraceptive polymer.

34. (Amended) A contraceptive as claimed in claim 33, wherein said electrically conducting material is taken between 3-8% by weight of said contraceptive polymer.

35. (Previously Presented) A contraceptive as claimed in claim 33, wherein said magnetic material is taken between 6-15% by weight of said contraceptive polymer.

36. (Amended) A contraceptive as claimed in claim 55 30, wherein the particle size of said microsize particles of said electrically conducting material is about 0.005 to 20 micron, and of said macrosize particles of said elecrtically electrically conducting material is about 150 micron to 0.2 mm.

37. (Amended) A contraceptive as claimed in claim 55 30, wherein particle size of said microsize particles of said magnetic material is about 0.005 to 15 micron and of said macrosize particles of said magnetic material is up to 0.5 mm.

38. (Amended) A contraceptive as claimed in claim 55 30, wherein said microsize and macrosize particles of said electrically conducting material are taken approximately in equal amounts by weight.

39. (Amended) A contraceptive as claimed in claim 55 30, wherein said microsize particles of said magnetic material are taken in a lower amount as compared to said macrosize particles of said magnetic material.

40. (Amended) A contraceptive as claimed in claim 55 30, wherein for every 100 mg of said contraceptive polymer about 200 μ l microliter of said solvent is taken.

41. (Amended) A contraceptive as claimed in claim 55 30, wherein said magnetic material is prevented from aggregation by suitable coating.

42. (Previously Presented) A contraceptive as claimed in claim 41, wherein said magnetic material is coated with cross-linked styrene maleic anhydride copolymer.

43. (Amended) A contraceptive as claimed in claim 55 30, characterised in that the removal of the contraceptive is achieved by an external magnetic field, preferably a travelling traveling magnetic field or, alternately, by flushing another injection of the said solvent.

44. (Amended) A contraceptive as claimed in claim 55 30, characterised in that the contraceptive is heated by electromagnetic induction with fields from outside the body, which in-turn causes lowering in viscosity of said contraceptive to effect facilitate the reversal thereof.

45. (Amended) A contraceptive as claimed in claim 55 30, characterised in that the *in-situ* flow of the contraceptive after injection is controlled by external means, preferably by the application of a drag force or a propelling force by means of an external magnetic field.

46. (Amended) A contraceptive as claimed in claim 55 30, characterised in that the presence of the contraceptive is detected

~~by external means, and partly quantified by measuring the residual magnetic field strength from outside the body.~~

47. (Amended) A contraceptive as claimed in claim 55 46, characterised in that ~~an~~ said external means include imaging by ultrasound, X-ray, CAT scan, MRI and scanning electrical impedance plethysmography.

48. (Amended) A process for preparation of a contraceptive characterised by dissolving the weighed quantities of styrene maleic anhydride copolymer, styrene maleic acid copolymer, an electrically conducting material and ~~said~~ a magnetic material in ~~said~~ a solvent medium, followed by keeping the complex solution of said copolymers, said electrically conducting material and said magnetic material in an inert environment, and shaking for about 45-50 hrs by maintaining the temperature at about 35°C.

49. (Previously Presented) A process for preparation of a contraceptive, as claimed in claim 48, wherein said magnetic material is coated magnetic material.

50. (Previously Presented) A process for preparation of a contraceptive, as claimed in claim 48, wherein said copolymers, and said electrically conducting material and said magnetic material are first mixed and then dissolved in said solvent.

51. (Previously Presented) A process for preparation of a contraceptive, as claimed in claim 48, wherein said copolymers, and said electrically conducting material and said magnetic material are directly dissolved in said solvent followed by mixing.

52. (Previously Presented) A process for preparation of a contraceptive, as claimed in claim 48, wherein said copolymers are first mixed and then dissolved in said solvent followed by addition of said electrically conducting material and said magnetic material.

53. (Previously Amended) A process for preparation of a contraceptive, as claimed in claim 48, wherein said electrically conducting material and said magnetic material are added either together or one after the other.

54. (Previously Presented) A process for preparation of a contraceptive, as claimed in claim 53, wherein said electrically conducting material and said magnetic material are added either together or one after the other.

55. (Deleted)

56. (Previously Presented) A process for preparation of a contraceptive, as claimed in claim 48, wherein said solvent is dimethyl sulphoxide.

57. (New) A contraceptive as claimed in claim 30, characterized in that the contraceptive is partly quantified by measuring the residual magnetic field strength from outside the body.